A DISCUSSION OF THE MATTER OF UNDERDHAINAGE.

The Kinds of Land That Need or Do Not Need Artificial Drainage-Hill Pastures-Grinding Feed for Stock-Smut of Oats-The Feeding Value of Stover-Something to Be Commended-Lice on Stock-Drhorning-Seed Potatoes-Stored Wool-Mutton as Wool.

porous sub soil capable of drawing off all | the case of other stock. surplus moisture. Most sandy regions have such a sub-soil, and occasionally we find a clay underlaid with a bed of gravel or sand sufficiently near the surface to too rapidly, and the saving comes from furnish complete drainage. All such mixing the meal with cut hay or fodder. lands do not need any artificial drainage, but their area is not large compared with that having a compact sub-soil. Of the latter class a large portion is supposed not not more. Horses do better when a little | this reason that they cannot thrive on fat to need under drainage, as it is sufficiently | oil meal is given them, and it is more rolling to cause the water to run off of it, and thus does not overtax the absorbing power of the compact soil beneath. It is probable that it will not pay to tile rolling land now, when much larger profits can | half masticated before he touches his hay, be gotten from draining the flat lands, yet | and we are often inclined to follow the old the day will come when we will tile all of and easy way, but the number of those our rolling land that has a tight sub-soil.

This belief is based upon the knowledge of the manifold benefits of tile drainage other than that merely of removing the surplus water. The effects of thorough drainage are so many and important that it is not easy to name the most valuable, air to the roots of plants. Roots need air just as much as any other organism, and die without it. If there is a surplus of water on and in the soil for any length of time plants turn yellow and become stunted. They must have air. Tile removes this surplus water and permits the air to enter. The air is partially excluded in any very compact subsoil, and thus tile is beneficial in rolling land, as it opens up the pores through the ground by which the water descends to the tile, and the subsoil is thus brought into a condition that rather attracts than repels the roots of the plants not only increasing the territory in which the roots may feed, but encouraging so deep a root growth that drouth is more easily withstood.

The dead water, that which fills all the air pores, is injurious to all mechanical conditions of the soil, as well as to the vegetable growth, by reason of the exclusion of the needed air. The surplus of water tends to solidify rather than to permit of pulverization of the soil by means of the air, heat and frost. It lies ready to raise the top soil by freezing, and either break off plant roots or pull them out of the ground. It is a cold body of water in early spring, and requires days of spring beat to evaporate it, but when it is drawn to the tile underneath it it leaves the ground in the best condition for warming by the heated air and for deeply-rooted plant growth.

The time is at hand when we cannot afford to ti I flat lands without underdrainage, natural or artificial. The dead water handicaps us, keeping us out of the fields after summer rains, when the plants need | fields to be bleached and otherwise cultivation. It putties the soil and pre- damaged by the winter rains indicates vents capillary attraction, the agency that draws moisture from beneath up to the plant roots when needed. It often keeps us from tilling a field, most of which is pleasant, and its bulk makes bonsing dry enough for tillage, because it collects | costly, but the nutriment it contains is in a basin in the center of the field and | too valuable to justify the present wasteforms a barrier. A tile through such a basin permits tillage of the higher ground when needed, before a crust is formed

that excludes the air. The conditions of a good crop include a porous subsoil in which piant roots may penetrate, in which air may pass to pulverize the soil and feed the plants in which there is no surplus water, in which a warm spring shower can enter, bringing heat for plant growth, and in which the mechanical condition is favorable to capiliary attraction to draw water to the surface in case of drouth. All this tile drainage gives. It insures in great measure against flood, action of frost and even drouth, the elects of the latter being warded off by the deeper rooting of the plants. It is not the panacea for all evils, but it is going to become more and more the foundation of all successful agriculture.

Our Hill Pastures.

When meadow land becomes foul the plow is put into it and a tilled crop is raised, fo lowed by a small grain crop and a reseeding. It is the thin hillsides that puzzle us. Bushes and briers spring up on every side and weeds encroach upon the grass The man with several hundreds of acres of such land feels somewhat helpless, while the smaller holder of land keeps these pests under control by his own hard labor. If it pays to keep ten acres clean, why not 100? As in all other things the fight against all such growth must be aggressive and constant if one would win.

H old pastures are full of bushes and briers it is not best to leave the cleaning | cases. until spring. When the ground is hard frozen and all grass and weeds are dead the cleaning can be done fast. With sharp hoes or mattocks cut everything of at the surface of the ground and pile it for burning if the growth is heavy.

This cutting will kill many of the roots. in the spring stock will eat a great deal of the new growth, and during a summer's and the growth of grass is greatly in- this is secured and the cheese properly creased.

The foul weeds are hard to handle, THE SENTINEL farmer carries a sack of salt, hung with a strap on the shoulder, when cutting thistes and drops a handful on each root after cutting. This should be done in dry weather. Broom sage is increasing fast in the North and bids fair to become as bad a pest with us as it is to our southern farmers. The remedy is not easy to find and prevention is worth more than any reputed cures. When the plant is beginning to gain a foothold it should be carefully destroyed. Some practice burning over the ground in the late fall beore the seed scatters, but it is much better to cut out the plants earlier in the season. This applies to fields when the pest first appears, but it soon gains such headway that if unchecked it is impossible to treat it in any such slow way. A watch should be kept for the first plants that spring up.

Thin patches in our hill pastures should have frequent reseedings in the fall. Often the harrow can be used with advantage before sowing the seed, and fertilizers of some kind should be used. In this way pastures can be kept fairly good. We have millions of acres in this country that grow grass well, but that cannot be plowed with any profit for a cultivated crop. When the grass runs out the land is nearly worthless, as reseeding is difficult. No If a single animal is unthrifty it may

OUR JANUARY FARM TOPICS | places, the land grows in value, while if neglected, the task of restoring the pastures seems too great to be undertaken.

Grinding Feed for Stock. Does grinding pay? Probably fivesixths of our farmers do not practice it. If there is profit in grinding then the aggregate loss is heavy. it seems strange that the advocates of grinding are so sure that it is paying them, and yet so large a proportion of farmers continue to feed whole grain. The writer believes that it pays to grind or crush all grain for stock, except poultry and possibly sheep. Poultry manage whole grain perfectly, and the weight of evidence in favor of feeding Nature has furnished some land with a ground grain to sheep is not as great as in

The benefit from the ground food does not come wholly in the aid to digestion, and when fed alone it may not pay for grinding. Horses usually bolt their grain Corn and oats should be ted together, and when ground and mixed with a little dampened roughness, it is safe to count on a saving of one-ourth of the grain if effective when mixed in chopped feed of some sort. The best balanced ration can be formed from ground food.

It is easier to throw corn or oats into the feed box and let the horse swallow it who do this is growing less as we learn more of the science of feeding and feel the need of practicing more economy. In some of our best stock sections grinding feed is nearly universal, but in some of our great states the wasteful methods prevail without scarcely an exception. In successful dairying grinding feed is almost a necessity. We be leve that those but none is greater than its power to give | who have begun grinding and mixing their feed would not return to whole grain

Smut of Oats.

The Michigan station says: The spores seeds of the smut) attach themselves to kernels of oats and are sown with them. When the kernel germinates the smut spores also germinate and enter the young plant, growing and subsisting on the inside of the plant until finally when the head appears it is smut instead of oats. It has cost nearly or quite as much to grow the affected plant as a healthy one. Certain conditions of soil or weather may be more favorable to the growth of smut than others, but let it be distinctly understood that its presence is not due to any condition of soil or weather. We sow sout and we must reap smut. The wind may carry the loose, powdery smut over the fields, and the spores become attached to the kernels of the oats. These spores are so small that they cannot be seen with the naked eve unless there are many together, but they are ready to be grown when the oats are sown. Probably the thrashing machine is the most effective way of bringing the spores into contact with the out seed. A single kernel may have thousands of these spores attached to it and may be killed by dipping the seed into hot water for a few minutes, and not injure the vitality of the seed. This method, known as the Jensen or hot water method, was discovered by J. L. Jensen of Denmark in 1887.

The Feeding Value of Stover. The amount of stover that is left in the that its true feeding value is not yet appreciated. The handling of it is not ful ways of not a few of our otherwise good tarmers. An acre of stover is worth considerably more than a top of timothy hay. The nutriment it contains is greater and the effect on stock is better in all

We have urged the importance of this feeding stull on our readers before this, and the necessity of caring for it. To any who may be inclined to doubt the correctness of our statement the following estimate of a five years' experiment by the Massachusetts experiment station is commended. Comparison of the value of en-ilage and fodder corn (corn grown for fodder) with that of hay is also valuable. The Bulletin says:

1. The high nutritive value of fodder corn, corn s over and good corn ensilage, as compared with that of English hay, counting in all instances pound for pound of dry vegetable matter, is in ly confirmed. The general condition of the animal on trial, as well as the quality and the layer of oysters, and the seasoning then quantity of the milk obtained, point in that direction.

2: To produce one quart of milk, using the same quality and quantity of grain feed, required in every instance a larger quantity of perfectly dried hay than of either fodder corn, corn stover or corn ensilage, in a corresponding state of dryness -stover leading.

The net cost of feed in the case of the same ration of grain feed is from onethird to one-half less per quart of milk, when fodder corn, corn stover or ensilage serve as substitutes for English hay in the daily diet of milch-cows, corn fodder as a rule leading, while corn stover leads the corn ensulage in four out of six

To be Commended.

It is noticeable that all the winter meetand the building up of the home trade to sauce over boiling water. Carefully rea larger extent. The cheese makers are not, as a rule, trying to please the home consumer, going too much on the suppomade there will be no reason why 90 per cent, of the people should say that cheese does not agree with them. The patron of a factory should be one of the most interested of the parties-not how poor milk can I furnish and yet have it accepted but how good milk is needed and how best attu:ned

Cleanliness from stable to curing room is a great desideratum. The factory man should be as tidy about the factory and its appointments as the model housewife. The factory and its surroundings may be more redolent with germs and ferments than the stable and its surroundings. While the cow should have good air, water and wholesome food and good care, the factory man wants pure water at the factory, bright utensils, tanks and vats that can be depended upon to fulfill the requirements of aids. Milk too old, overheated milk, milk not areated properly, mixed milk of different ages, etc., are the things one must closely watch or else trouble is ever creaping in. When the great bulk of cheese in this country is made as good as the present best, we shall export very little, if any cheese, as we now consume nearly 400,000,000 of the 500,-

000,000 pounds annually made.

A good farmer may get lice on his stock. other land on the farm should have more spread them throughout the stable. For care. If the shrubbery be kept down and this reason great care should be taken, seed with fertilizers be used on the thin and these pests routed at their first ap- two raw eggs, best then with one tea- use the best that money can buy .- Editor.

TO EXPEL SCROFULA

from the system. take

AYER'S Sarsaparilla

the standard blood-purifier and tonic. It

Cures Others will cure you.

pearance. The remedies that are advertised so extensively are not needed. Grease is destructive to lice, and it is for animals whose hair is full of natural oiliness. A good exterminator is made of two parts of lard oil and one part kerosene. When an animal is badly infested two applications should be given. The treatment should be followed by a liberal use of the comb and brush to open up the

pores of the skin. Another re nedy even better than oil is a mixture of starch and water, made by boiling potatoes thoroughly done and mashing them in the water. It should be and the application should be followed by a good currying. It is safe to say that tens of thousands of head of stock are sufand the application of one of these simple save their owners from constant loss.

Dehorning. Cattle needed horns as defensive weapons when running wild over the plains, but of what use are they now? If they are not a benefit in any way and are an injury in many ways, they should go. What is more cruel than to permit a vicious steer or cow to horn and bully a meek or weak fellow from morning until night in a feed lot? And yet this is seen every day. Some of the men who permit this cry out against the alleged cruelty of removing the horns. Dehorning, like tooth pulling, must hurt for the moment, but experiments with dairy cows prove that the suffering does not last, as the flow of milk is not disturbed in any marked degree. At least the calves should be "dehorned" by the use of a caustic on the incipient

See : Potatoes. It is a demonstrated fact that the largest vield of potatoes can be gotten by planting whole tubers of large size. They furnish plenty of vitality and nutriment for the stalks. But their cost is so great that their use for seed is unprofitable. The next best seed is a medium potato cut not be observed. These adhering spores into halves or quarters. The craze for close cutting of seed is going out. A few who have very ferti e lands and prepare it perfectly, do well with seed cut to the eye. but ordinary soil requires more seed. The safest way for all beginners is to use plenty of seed, and as they learn to till better they can increase the size of tubers hy reducing the amount of seed, although the total vield may not be increased.

> Stored Wool, Will stored wool lose in weight as some dealers claim? Or will it gain in weight as some stockmen assert? One needs to know about this when he is deciding whether he will hold or sell his clip. A careful test by an Ohio farmer seems to prove that there is a slight gain. We beieve that it is safe to count on very little if any loss in weight in stored woo.,

Mutton as Food, There is no more healthy meat than mutton. It is preferable to pork and just as nutritious as beef. It is strange that more of it is not used on the farm. When a beef is killed there is too much tresh beef to handle, but the carcass of a young sheep is not so large but that a family can use it before it becomes stale, if the weather is cool. Our farmers could help the sheep industry by making a demand for it at home.

Recipes.

Escalloped Oysters-Take the oysters from the liquor, wash them carefully in a baking dish, grate bread crumbs highly seasoned with pepper and salt and a pinch of celery seed over them. Add another one of grated bread, and so on until the

Oyster Salad-Take half a gailon of fresh ovaters, the yolks of six hard-boiled eggs, one raw egg well beaten, two tablespoonfuls of melted butter, a tablespoonful of mustard, with pepper and salt, a teacup of vinegar and four bunches of celery. Drain the iquid from the oysters and put some hot vinegar over them; set on the fire five minutes; let cool; mash the volks of the eggs and mix all the seasonings together and pour over the ovsters and cel-

Oyster Pates-Line small pate pans with pull paste; roll cover somewhat thicker than lining; put in each of the pans a piece of bread to support the cover while Miss Virginia Fair Engaged to a baking. Make a white sauce of one tablespoon of butter, two tablespoons flour ings are giving an unusual amount of at- and one pint of cream. Cut the oysters tention to the production of better cheese; into small bits and cook them in the move the upper crusts; take out the pieces of bread; fill with the hot oysters and serve at once.

To Fry Ovsters-Use the largest and cover the ovsters; dip the ovsters first into pan and fry quickly to a light brown. | Rothschilds in New Rork.

Serve dry and let the dish be warm. Ice Cream Cake-Take the whites of eight eges, beat to a still froth, two cups sugar, one cup butter, one cup sweet milk, two cups flour, one cup cornstarch, two teaspoonfuls baking powder. Cream the butter and sugar, sift flour, cornstarch and baking powder, add the beaten whites of the eggs last. Bake in jelly tins. For the icing, boil four cops sugar until it will candy, and pour over the beaten whites of four eggs, and add one tesspoonful pulverized citric acid. Stir until cold and spread

between layers. Cocoanut Cake.-One cup sugar, one fourth teaspoon sods, one teaspoon boiling egge, stir in the sugar, then the whites of the eggs, beaten to a stiff from: then the boiling water; bake in three or four cakes in a pretty quick oven; make an icing of the whites of two eggs and six heaping teaspoons of powdered sugar; spread the | to say from personal experience that Sulicing on one cake, then a layer of coroanut, then icing, then another cake, etc. If you use prepared cocoanut you must moisten with milk before using.

Salaid Dressing .- Take the yolks, of

spoonful of made mustard; this mustard should be mixed with water, not vinegar; then add to this, drop by drop, olive oil, stirring constantly until the mixture be- Contrary to the Expectations of comes very thick; then add two teaspoons of powered sugar and a scant one of sait; mix thoroughly; squeeze in the juice of one lemon; beat well, and if too thick, thin with a little sweet cream. If preferred, omit the lemon and cream and use vinegar. This dressing with lettuce, ce ery or potato makes a delicious salad. If needed for chicken salad the velks of hard boiled eggs added makes it richer. Garnish lettuce with nasturtium blossoms cold boiled beets, chopped parsley and sliced lemon.

Rose Biscotines-Take one pound fine dry pasty flour, eight ounces castor sugar, eight ounces butter (iresh), one-half ounce fine-sifted biscuit powder, a hock glassful and then the other ingredients well rubbed into them. The sugar should now be mixed thoroughly and a space made in nice, firm, saiff paste. Roll this out into a | though at present the clique suspected is and keep them there till quite done. Roll | rapid advance. Armour ran a deal in as thin as possible and they will bake in a pork several years ago, according to genhot oven in twenty minutes. Chicken in Jel y-C ean and put on to

boil a plump chicken, allowing a pint of

weight. When the water is heated to the applied as a wash in a very thin state, | boiling point skim it and set the pot back where it will simmer until the meat is tender, about an hour and a haif. Then remove the chicken, skim it and remove fering more or less by reason of this pest, | a | the flesh from the bones; then put the latter back in the kettle and let the liquor remedies would not only relieve them, but | boil until it has been reduced onehad. Then strain the liquor and put it away to cool. It will get into a regular jelly. Then remove the fat and put the hardened liquor into a saucepan, and add a quarter of a package of gelatine for each quart of jelly-soak the gelaune for an hour in half a cup of cold waterwelve peppercorns four cloves, a small piece of mace, a stalk of celery, an onion, the white and shell of an egg; salt and pepper to taste. Let the ingredients boil up once, then put the saucepan back where it wil simmer for twenty minutes. Then strain the jelly through the napkin. Put a layer of it three-quarters of an inch thick in a mold and put the mod in ice water to harden. Cut the flesh of the chicken into long, thin strips, season them well in the mold when the jelly is hard. Pour ready to be served, dip the mold into mass. A garnish of pars ey improves its appearance, and tartare of mayonnase sauce may be served with it.

CURED OF A BROKEN BACK.

John Mulligan's Recovery After a Supposed Fatal injury.

PITTSBURG, Jan. 9,-Drs. James and Thomas McCann of Pitt-burg are about be buyers. ready to report to the medical fraternity the case of John Mulligan, who was cured of a broken back. In October, 1889, white Mulligan was descending with a wheelbarrow under an iron one e ivator at Laughlin's furnaces the elevator dropped. He received a tracture of the vertebrae. and as usual with such cases, was paralyzed from the loins down. Eight days after Mulligan's entrance to the hospital the physicians in the presence of seventyfive students of the West Pennsylvania medical college made an incision eight inches long in the man's back. The vertebre was exposed. A fracture of the arches of the tenth and eleventh vertebrae was found. Fragments of bone were pressing on the spinal cord. This pressure was relieved. Two months later Mulligan could move his right leg. In ten months the patient wa ked out of the hospital. He is now at work. The report of the operation was kept secret until it was certain the operation would prove a success.

HOW A GIRL DOES.

She Leaves Her Romeo at the Rail With Only a Coin.

PITTSBURG, Jan. 9 .- Miss Mary Seidler and Andrew Parker were to have been married in St. Michael's church, at Braddock, yesterday. While kneeling at the sacristy rail waiting for the priest Mary got up, and to the surprise of everybody in the church walked out. The de-erted groom to lowed and caught up with her in the vestibule. Miss Seidler said she could not marry him. Parker then demanded to be reimbursed to the extent of manded to be reimbursed to the extent of white, 31c; No. 2 rye, 56c; No. 2 bariey, 65c; \$1.50, which he paid for the marriage No. 3, f. c. b., 41(661c; No. 1 flaxseed, \$1.00; license. The girl handed him a \$5 gold prime timothy seed, \$1.97; mess pork, per piece. He refused to give her the change and knocked her down. She had seen an old lover in the church, and will marry him when the excitement blows over.

WILL MARRY A PRINCE.

Grandson of Poland's Last King.

San Francisco, Jan. 9.—It is announced here positively that Miss Virginia Fair, better known as "Birdie," is engaged to be married soon to Prince Poniatowski, grandson of the last king of Poland, Miss sition that the consumer in Europe is a best oysters: lay them in a row upon a richs. She is not quite nineteen years Grouth the ground should be again cleared. better buyer than the one at home. clean cloth and press another upon them, old. By her mother's will she has \$2,500 a Cheese should not only have a pleasant to absorb the moisture; have ready sev- year income, and in six years she will inthe situation; the growth becomes lighter buttery flavor but a digestive quality as eral beaten eggs, and in another dish herit \$1,500,000 in coin. From her father, and can be removed at less expense. A well. A good cheese should have fully 33 some finely crushed crackers; in the fry- when he dies, she will get not less than little persistent work makes the field clean per cent. of its weight butter fat. When ing pan heat enough butter to entirely \$5,000,000. She is well educated and has a strong and brilliant contralto voice, white, 37e; No. 2 yellow, 38c; No. 2 mixed the eggs, then into the crackers, rolling it | which has been highly cultivated. She | 37%c; No. 3 mixed, 38c bid; No. 3 yellow, loads through, 165 sale; opened higher; or them over that they may become well met the prince last summer at Newport. 37%; No. 4 yellow, 36%; No. 4 mixed, 36%; encrusted; drop into the granite frying He is connected with the branch of the no grade, 25e; sound ear, 39c.

TO HIS HEALTH.

A Father Dinks Carbolic Acid for Wine and Dies.

Pottstown, Pa., Jan. 9.—There was a dramatic termination to a gay social gathering here Saturday night. A large number of young people had gathered at the home of Myers Pollock, and the fun ran high. All went merrily until it was time for the wine. Then Nathan Pollock, the eup flour, half teaspoon cream tarter, one- sged father of Myers Pollock, took a bottie, poured out a cup of the liquid, raised water, three eggs; best the yolks of the it and proposed a toast for his son and the company. He drained the glass and groaned aloud. The liquid was carbolic flour, with the cream of tartar mixed acid, which he, partially blind, had misthrough it; then the soda dissolved in the | taken for wine. Pollock was dead in less than half an hour.

I Am Proud phur Bitters, which advertisement will be seen in another column, is the best spring and blood medicine to be found. It is prepared by an honest firm, who scorn to use cheap and worthless medicines, but PORK OPENS LOWER

Brokers.

CHICAGO, Jan. 9 .- Contrary to predictions May pork opened at \$18.45 this morning, a break of 25c a barrel from Saturday's closing price. This was due to the heavy selling orders received and the under estimation of hog receipts. About switching: Jan., 50(350% o. closing 50%c; 30,000 hogs was the estimate for today. and sliced lemon. Garnish potatoes with but according to the report of various houses anywhere from 31,000 to 35,000 were received. Speculators wanted to realize and especially that portion known as "tue country," and nearly every order was filled from \$18.45 to \$18.421, tha low of rose water, two eggs. The flour and mark of the day. Then the "big fet ows" biscuit powder should be sifted together started in and the product was run up to \$19,124, closing strong at \$19,074.

The trade is yet undecided as to whether there is a corner in pork or not. May is a the center of the lot, in which the eggs | long way ahead and it seems improbable and rose water should be poured. Stir | that any syndicate is at work on a corner everything well together and produce a for that month. Still pork is scarce, and sheet rather less than one-eighth of an inch | "scalping" on the market, there is a genthick and then stamp the biscotines out of | eral feeling among the traders that there it with a small fluted-edged oval hand- is danger of a "squeeze" later on. Cudahy cutter. Now lay these cakes on buttered | and Wright have been absolved and baking tins, put them in a warm oven | Philip D. Armour is given credit for the eral belief, in which a number of prominent traders were badly "sqeezed."

But for the nervous and strong market for pork and ribs it would have been a water for each pound of the chicken's day to remember on the board of trade for its phenominal duliness. Some of the apathy shown by the traders was ascribed to the election in progress for president and directors, but there was nothing in the news of a stimulating character and that was probably the main cause of the day's dul ness. Compared with Saturday's closing prices wheat is to lower, corn is off from ic to ic, oats ic and lard 10c. Pork is 37 c and ribs 74c higher. Wheat was slow all through the se sion and kept within &c ran e. The northwestern receipts were small for Monday, but the local receipts were near v 175 cars above the estimate, and the trade was inclined to wait the annonncement of the visible supply, which was late in coming in. The reports showed a smaller increase than generally expected and tended to keep prices rather The provision market was very unset-

tled, and for a time it looked as if the high prices were at an end. There was a large element in the regular trade that sold early. Grain houses belped to raid with salt and pepper and lay them light v | the pork market. Commission houses had selling orders from the outside, Mess the rest of the jelly into the mould and | pord started on a sharp decline and at the put it away to harden. When the dish is low point the first few minutes showed about 30c loss from Saturday. Lard and warm water and turn it upside down on a | ribs at the same time showed 20c loss. The platter, its contents will slide out in one | weakness was very deceptive. An hour later prices were up and around the Saturday figures. After a pause there was a second bulge, and May pork touched \$19 on a bid for 500 barrels at 5c over the market. There was another lu l when a third and later bulge put prices still higher. Although hog receipts were over the estimate at 31,000 to 35,000, the market at the yards kept strong. A few ventured to sell short, but the most of the se ling at any time was by holders with profits. Armour and Ream were said to

Estimated receipts for tomorrow-Wheat, 410 cars; corn, 405 cars; oats, 190 cars; hogs, 25,000. In corn initial transactions were at about final quotations of Saturday, and sagged off under moderate offerings ic,

influenced by a decline in the surrounding pits, but at 46c for May there was quite an active demand and the price soon rallied, recovering the early loss, but again eased off on se ling by brokers supposed to be represented by local e evator concerns and by the local crowd in general on the liberal estimates for tomorrow and increase in the visible supply, the price reac ing lock, ruled steady and closed with la closs.

Oats were moderately active and easier. Price changes were confined to |c range. The leading futures ranged as follows: and the second s

Artieles.	O acting.	li ghest.		Lowest.		Closing.	
WHEAT -	-		200			-	200
Jan May		3	737	75364	72.19	743.70	323
July			2744	1.180	7/67	27/0	778
COR -		Ť	0.00		125.0	F.5.00	mag
Jan	4134	1	4150		4134	41346	6415)
Feb	4234	ā i	42%	1	425%		421
May	4654(8465)		4634		46	4634@	46%
OATS-						1.50	
Jan	3034		301,		3034		303,
) eb.,			STE		3134		3134
May	34%(0.34)		34%		DF.	34590	1947
Pobk- Jan	17 93	10	60	12	95	19	60
May	18 45		125		4234		073
LARD-	20.30	447	34/3	49	79.73	8.07	27.73
Jan	10 80	10	80	10	75	10	75
May			75		5754		79
S R ns-			(7.67)				
Jan	9 60	9	60	9	60	9	60
May		9	7730	19	5254	9	7734

No. 2 red, 72%c; No. 2 coro, 41%c; No. 2 cats, 301/4c; No. 2 white, f. o. b., 34@341/4c; No. 3 brl, \$17.85@17.90; lard, per 100 lbs, \$10.75; short rib sides (loose), \$9.00 @0.65; dry saited shoulders (boxed), \$0.6214 @9.75; short clear sides (boxed), \$10,25@10,85; whisky, distil ers' finished goods, pergal, \$1.30; sugars, out loaf,

unchanged; No. 3 corn, 37	o.	
	Receicts.	Shipments.
Flour, bris	11,000	11,000
Wheat, bu	203,000	12,000
Corn, bu	157,000	83,600
Oate, bu	217,000	160,000
Rye, bu	7,000	3,000
Barley, bu	36,000	38,000
On the produce exchar	ige today	the butter
market was firm; creame		

20(4,28c. Eggs-Strong; strictly fresh, 25(4,29c. Local Grain Market, INDIANAPOLIS, IND., MONDAY EVENING, Jan. 9, 1

Wheat-Easier; No. 2 red, 67c bid; No. red, 63%c; No. 4 red, 55c; rejected, 50c; unmerchantable, 45@50c. Corn-Steady; No. 1 white, 39e; No. 2 white, 39c; white mixed, 385cc; No. 3 white (one or two colors), 32c; No. 4 Oate-Firm; No. 2 white, 35140 bid; No. 3 white, 31@34/4c; No. 2 mixed, 32/4o; No.

3 mixed, 31c; rejected, 29c.

Bean-Dull; \$11.25.

Ray-Choice timothy, \$12.00; No. 1, \$11.25 old; No. 2, \$8 50 bid; No. 1 prairie, \$7 bid; No. 2 prairie, \$5.50; mixed, \$8; clover, \$9 bid. Rye-No. 2, 40c for car-lots; 38c for wagon. Wagon Wheat-660 bid, Inspections: Wheat, 4 cars; corn, 32 cars;

oats, 1 car. PRODUCE MARKETS.

Quotations from New York, Cincinnati and

Elsewhere, INDIANAPOLIS, IND., MONDAY EVENING, Jan. 9.] Provisions are very strong. The second advange since last Thursday occurred yesterday.

Poultry continues strong, with a slight raise

yesterday. Butter steady. Potatoes strong,

with slowly advancing tendencies.

NEW YORK, Jan. 9 .- Flour-Receipte, 26,776 packages; exports, 800 bris, 21,229 sacks; dull, steady; sales, 8,100 bris, Corn meal—Dull, steady. Wheat—Receipts, 13,950 bu; exports, 122,848 bu; sales, 600,000 bu sutures, 8,000 spot; spots dull, easier; No. 2 red, 78% @79e; stere and elevator, 79% @ Ocafloat, 78% (280% c f. o. b.; No. 1 northern, 82% c; No. 1 hard, 83% c; No. 2 northern, 79% c; No. 3 spring, 74% c; options opened at 1469 %o decline on eastier cables, reacted %@%o on firmer west and shorts covering declined 14@16c on realizing, closing steady at 14@16c below Saturday, with trading very duli; No.

2 red, Jan., 77%@78%c, closing 77%c; 825 (6,82 9-16c, closing 82 . 6: 946; rye, 123,268; tarley, 156,272; mait, 17,754; peas, 632 bu. Barley-Quiet. Corn-Receipts, per 100. 10,400 bu; exports, 82,777 bu; sales, 250,000 bu futures, 120,000 bu spot; spots moderate y active, firm; No. 2, 50 (450 40 elevator, 51 46 511/4 affoat; No. 3, 49(0.45); steamer mixed, 50% @50%c; options were moderately active and opened weak at a decline of 1,0%c, advanced 16 %c as following the West, duit, with trailing chiefly closing 5134@52 5-16e. Oats-Receipts, 85,000 bu; exports, 125 bu; sales, 10,000 bu futures, 70,000 bu spot; spots duit, steady; options steady, neglected; May, 39 &@ 30%c; do spot, white, 42%@12%c; mixed western, 37(339c; white do, 40(446%c; No. 2, Chicago, 38%c. Hay - Quiet, stendy. Hops-Steady, quiet. Cones-Options opened steady, unchanged, to 10 points decline; closed quiet, unchanged to 10 down; sales, 15 250 bags, inoluding Jan., 15.85@15.90c; Feb., 15.70c; March, 15.60(@15.75c; April. 15.50(@15.60c; May, 15.40@ 15,50e; July, 15 50e; Sept., 15 4 (a,15,55e; spot Rio, duli, easy; No. 7, 1634@16%c. Sugar-Raw firm, quiet; sales, 4:0 bags centrifugal, 96 test, 3 7-16c; refined lairly active, firm. Molasses-New Orleans steady; fair demand. Eggs-Fair demand, firm; western best, 301/6 31c; receipts, 6 000 psekages, Hides-Moderate demand, stendy. Pork-In higher demand; old mess, \$17.50@17.75; new mess, \$18.25@ 18.75; extra prime, nominal, Cut meats-Good demand, stronger; pickled beilies, 1016; do shoulders, 9%c bid; do hams, 13c; middles, firmer; short clear, 101/20. Lard-Quiet, firmer; western steam closed at \$11.15@ 11.20; sales none; options sales, 500 tierces; Jan., \$11.1216; c osing at \$11.10; March, \$10.95; May, \$10.95 bid. Butter-Moderate demand irm; western dairy, 17@24e; do orenmery, 23@33e; do factory, 15@23e; Elgin, 321/@33e. Cheese-Fair demand; firm. Pig Iron-Dull, steady; American, \$12.25@15.50. Copper-Steady; lake, \$12.20. Lead-Dull, steady; domestic, \$3.85. Tin-Quiet; straits, \$19.60. CINCINNATI, Jan. 9. - Flour - Firm; fancy, \$3.10@3.30; family, \$2.25@2.50. Wheatin moderate demand; No. 2 red, 7014c; receipts, 1,500; shipments, 2,20, form-In moderate demand; No. 2 mixed, 41@4136e, Oats-Firm; No. 2 mixed, 34c, Rye-Strong; No. 2, 60c. Pork-Firm; held \$19. Lard-Firm; \$10.75@11. Bulk meats-Stronger; short ribs, \$10. Bacon-Firmer; \$11.25. Whisky-Steady; sales, 1,109 bris; \$1.30. Butter-Firm; fancy Elgin creamery, 32(a34c; Ohio, 25@27 ; prime dairy, 20c. Sugar-Firm; partly refined, 414@51/e; New Orleans, 314@434c. Linseed oil-Firm; 47@49c, Egg-Strong and higher; 30c. Cheese-in moderate

demand; prime to choice Ohio flat, 91/40101/c. TOLEDO, Jan. 9 .- Wheat-Dull, easier; No. 2 cash and Jan., 73c; May, 78%c. Cora-Dull, steady; No. 2 cash, 41c; No. 3, 40c; No. 4, Oats-Quiet; cash, 35c. Rye-Firm; cash, 56c bid. Cloverseed-Dull, steady; prime cash and Jan., \$8.15; Feb., \$8.20; March, \$8.25. Receipts-Flour, 138 bris; wheat, 10.805 bu; corn, 125,704 bu; oats, 700 bu; cloverseed, 458 bags. Shipments-Flour, 402 bris; wheat, 9,900 bu; corn, 1,000 bu; oats, 1,2000; rye, 1,000 bu; cloverseed, 113 bags. BALTIMORE, Jan. 9.—Wheat—Dull; No. 2 red, spot, 77%c; Jan., 77%c; Feb., 78c; May, 81%c. Corn-Strong; mixed, spot, 51c; Jan., | %c over tierces, 49%c; May, 50%c, Oats-Firmer; No. 2 white western, 41(0)41%0. Rya-Dull; No. 2, 59: bid.

Eggs-Uncertain at 33c. Collee-Steady; Rio No. 7, 16%c. LIVERPOOL, Jan. 9 .- Wheat-Quiet, holders offer moderately. Corn-Firm, demand fair; mixed western, 4s 3% d per cental.

LIVE STOCK MARKET. UNION STOCK YARDS, INDIANAPOLIS, Jan. 9. 1 CATTLE-Receipts, none, therefore no change in the market. The outlook favorable for good kinds. We quote: Expert grades, 1,450 to 1,650 lbs...\$ 4 75@ 5 25 Good to choice shipping, 1,200 to 1,450 Iba Fair to good shipping, 800 to 1,200 3 25@ 3 75 Choice feeders, 1,100 to 1,200 lbs... 2 50 0 3 85 Common to good stockers, 600 to 2 00@ 2 50 \$1.30@1.53. 800 lbs.....

3 (0%) 3 50 Choice heifers ... Good he fers Fair to medium heilers Common and light be fer 1 25(a) 1 50 Export cows Good cows Fair to medium cows 1 00% 1 25 Common to fair cows 3 00% 6 00 Veal caives ... 2 75(0 3 00 Export bulls. Good bulle .. 1 5000 2 00 wood feeder bulls .. Cood to choice cows and calves ... 25 00(a35 0) Common to fair cows and calves. 10 00@20 00 | choice, 42@48c. SHEEP AND LAMBS-Receipts, none. Market looks steady. We quote:

Good to choice sheep Fair to medium sheep 3 75(4,4 25 Bucks, per head. Choice ewe and wether lambs 5 00(a) 50 Good to choice lambs .. Fair to good lambs .. Hogs-Receipts, 600. Market opened slow and 5 to 10c lower. Closed steady. We quote: 97 50(d)7 70 Choice heavy shipping 7 40(6)7 60 Heavy and mixed packing. 7 35(2.7 50 Choice lights .. 6 75(47 25 Common lighte. 6 25 6 7 15 Roughs ... 6 00@7 15 REPRESENTATIVE SALES.

 No.
 /e.
 Pr.
 No.
 /e.
 Pr.

 13
 220
 \$7 15
 82
 200
 \$7 60

 74
 170
 7 45
 68
 210
 7 65

 14
 160
 7 50
 45
 230
 7 65
...200\$7 60 NEW YORK, Jan 9.-Beeves-Receipts for two days, 4,124 head, including 48 cars for sale; market firm and 10 to 15c per 100 pounds higher; native steers, \$4.35@4.36 per 100 pounds; bulls and cows, \$1.80@3,50; dressed beef firm at 8(a9) e per pounc; shipments tomorrow,

1.255 beeves. Calves-Receipts for two days, 722 head; market firm; weal, \$5@9 per 100 pounds; grassers, \$2.25@2.90; western calves, \$3@3.40. Sheep and Lambs—Receipts for two days, 16,298 head; sheep firm; lambs du'l and 1/40 per pound lower; sheep, \$3.26@5.70 per 100 pounder lambs, \$5@6,75; dressed mutton firm at 7(a.9c per pound; dressed lambs dull at

Hogs-Receipts for two days, 11,143 head, consigned direct, nominally at \$7(\$7.60 per 100 pounds. CHICAGO, Jan. 9 .- The Evening Journa Cattle-Receipts, 18,000; shipments, 4.300;

market 10@15c lower; best natives, \$4.75@5.35; others, \$3(@5.65; stockers, \$2.25(@3.40; cows, \$1.80 @8.60. Hogs-Receipts, 32,000; shipments, 11,000; market closed strong; rough and common, \$6.90(27.30; packers and mixed, \$7.35@7.55;

prime heavy and butchers, \$7.55(47.85; sorted light, \$7.50(a7.60; other lights and pigs, \$6.35 (07.45. market steady; ewes, \$3.80(@4.40; mixed. \$3.75 (a.4.50; wethers, \$4.75(45.25; westerns, \$4.85(a) 20(a.25c. 5.05: Texans, \$3.75(a4.60; rambs, \$4(a6.10. BUFFALO, Jan. 9 .- Cattle-Receipts, 151

common to fair, 10@20c stronger; good grades, 20(a)25 higher; extra steers, 1,500 to 1,600, \$535. Hoge-Receipts, 100 loads through, 75 sale; market strong for good grades; heavy corn-fed, 27 85(47.90. Sheep and Lambs - Receipts, 11 loads through, 102 sale; market steady for sheep; shade easier for lambs; choice wethers, \$5.25; sheep, \$4.75; Canada do, \$4.65; Canada weathers, \$5; lambs, native, choice \$6,25; Canada common, \$6.15.

EAST LIBERTY, Pa., Jan. 9 .- Cattle-Receipts, 1,560; shipments, 780; market strong at about last week's prices; 8 cars of cattle shipped to New York today, Hogs-Receipts, 9,500; shipments, 3,300; market active, fair; light to best heavy, \$7.60@ 7.90: 15 cars of hogs shipped to New York

Sneep-Receipts, 6,400; shipments, 2,400; market slow at last week's prices. CINCINNATI, Jan. 9. - Hoge - Strong; 6.75@7.75; receipts, 6.200; shipments, 2,200. Cattle-Strong; \$1.50@5; receipts, 1,000; shipments, 100, Sheep-Strong: \$3@5.25; receipts, 200; shipments, none.

Lambs-Searce, higher; \$4@6. Elgin Butter.

ELGIN, Ill., Jan. 9.-Butter-Active; sales, 23,640 lbs, at 32c. INDIANAPOLIS WHOLESALE MARKET,

Bar iron, \$1.80@2.00, base; wrought chargoal bar, \$2,90@3.00, base, Horseshoss-Burden's, \$4.15; Perkins', \$4.15; mule shoes, \$5.25; natural gas company out-nail rate for 50s and 60s steel nails, \$1.70; firmed. Howard, J.

Iron ann Hardware.

horse, \$4.50 per box; wire nails, rate, \$1.75. Barb-wire-Galvanized, \$2.85; plain annealed July, 83%(283)4c, closing 83%c. Stock fence wire, \$2.00; gaivanized, 50c advance; 10, of grain in store and affoat Jan. 7: 11 and 12 sizes the regular advances. Powder Wnest, 15,783,820; corn, 1,621.347; oats, 1.792. - 3.50 for 25-1b key. Shot-\$1.50 a sack Loaded shells-12 gauge, \$1.35; 10 gauge, \$1.70 SMOKED MEATS.

Sugar-cured hams-Ibs average 18 lbs average. 15 lbs average. 1435 1254 lbs average ibs average. "Reliable" brand-Block hams, 16 to 20 lbs av. Virginia hams, "F. F. V." brand, 12 lbs... 15 Boneless ham, "Rel able" brand ... California ham, "Reliable" brand-10 to 12 lbs-average 11 Morgan & Grey's Breakfast bacon-elear English cured "Reliable" brand English cured, Morgan & Grey... Choice sugar-cured-"Porter" brand. English cured Breakfast backs, 7 to 8 lbs.. 12 English cured Breakfast breasts Brenkfast rolls. Shoulders-English cured shoulders "Reliable" brand, 12 ib average ... 16 lbs average.

Clear bellies, 12 lb average...... 18 to 22 lbs average 11% Clear backs, 10 to 15 lbs average... 12 French backs, 15 lb average 10% Dried Reef-'Reliab e" brand hams, inside pieces and knuckles

Bacon-Clear sides, 22 to 25 lbs average ... 12

16 lh average. 1132

40 lb average 11%

Morgan & Grey brand, 12 to average ...

Special selection of knuckle pieces or inside pieces, be advance. "Morgan & Grey" hams, outside only 6% Beef Tongues-400 each. Sausage, Ete-Fresh pork sausage, in link. in bulk, 2016 pails 934 Smoked pork sausage...

Bologon-Cloth, 60; skin, 61/4a. Wienerwurst-814c. Holsteiner Sausage-12a. Liver Sausage-7o. Head Chees-7c. Spiced boneless pig's feet in 8 lb crocke, 9%a. Summer sausage-15c DRY SALT MEATS.

Clear sides, 22 to 25 lb average .. 40 lbs average. Clear bellies, 12 lbs average. 111% 18 to 22 lbs average. Clear backs, 10 to 15 lbs average French backs, 15 lbs average..... PICKLED PORK. Bean pork (clear) per brl 200 lbs. .. \$22 50 Faculty perk ...

Rump pork .. Also nait barrels 100 lbs, at half the price of the barrel, adding 50c to cover additional cost of package. Lard-Kettle rendered in tieroes, 12%o: "Reliable" brand, 12%c; "Indiana" brand, 12c;

also in tubs, to ibs net, %cover tierces; pails 28 lbs, net, '40 over tieroes; buckets, 20 lbs net Cans-Gross weights, 50 lbs in single cases Hay-Quiet and steady. Grain Freights-Quiet; | tierces; 20 lbs in case of 4 cans, 36c; 10 lbs in steamer o L verpool, 1 : Cork, for orders, 2s. | case of 6 cans, 3/c; 5 lbs in case of 12 cans, 3/c; Provisions-Steady; mess pork, \$17.75. Lard-3 lbs in case of 20 cans, ic.

Refined, 11%c. Butter-Firm and quiet; fancy, FRESH PORK. Loins (short out), 14 to 20 lbs., 11c; (short cut), 13 ibs, and under, 111/20. Cottage hams ... Boston shoulders (skinned) ... Ham butts or pork rosst Trimmings Groceries.

Canned Goods-Blackberries, 2 lb, 90c; cove oysters, I lb full weight, 250 at1; 1 lb light weight, 65e; 2 th full weight, \$1.75@1.80; light weight, \$1.20@1.30; peaches, standard 3 ib, \$2 (42.10; seconds 3 ib, \$1.80@1.90; pis, \$1.30; pineapp e, standard 2 lb, \$1 40(4)1.75; seconds 3 sifted, \$1.85(a.2.25; early June, \$1.15(a)1.25; mar Light feeders, 800 to 1,000 lbs..... 2 50@ 3 00 | row, \$2@2.25; soaked, 75@85c; tomatoes, 3lb, \$1.10 m1.20; corn, standard, \$1.10@1.20; cream,

> Sugar-Hard, 514@51/e; confectioners' A. 2 50@ 2 75 4.98e; or A. 4%(a4) ac; white extra C. 4.56@ 2 00@ 2 25 4%c; extra C. 4.00c; good yellow, 4.54c; fair yelow, 4%c; yellow, 3%c. 2 7500 3 25 Staroh-Refined pearl, 2%@3c per lb; 2 2500 2 75 champion g oss, one and three pound pack-1 25@ 2 00 ages, 5@5) c; champion gloss, lump, 3@3) c; one and three-bound packages, 5@5% o; im-

proved corn, 6@6%c. Spice-Pepper, 12%c; allspice, 12@13c; 2 00(a) 2 50 | cloves, 15(a)Te; cassis, 10(a)Je; nutmeg, 75@ Molasses-New Orleans, 30(@40c; fair, 40c;

Sait-In car lots, 95c; small lots, \$1. Co ee-Common to good, 21@23%c; prime to choice, 25%@26%c; fancy, 26%@27%c; golden Rio, 27/4@29%e; Java, 30/4/931%e; Banner packages, 23%c; Arbuckle's 23%c; 3 00@5 00 | Lion, 23%c; Jersey, 23%c.

Miscellaneous-Rice, Louisiana, 3%@61/c; 4 50@5 00 enal oil, 634@1034c; beaus, navy, \$2.25; me-4 00@4 50 diam, \$2.10; marrowiat, \$2.50@2.75. Fruits and Vegetables.

New California cabbage in crates, \$3.50@4; Jersey sweets, \$4.50; Southern, \$3.25@3.50; Illinois sweets, \$1 per brl. Apples-Baldwin, \$3.25 perbrl.; fancy. Lemons-Fanov, \$4.

Cranberries-\$9.50(2)10.50 per brl.; \$3(23.25. Cabbage-\$2,50 per brl. Potatoes-85(a95e per bu. Cocoanuts-\$5.50 per hundred. Persimmons-\$1@1.25 per crate. Oranges-Florida, \$2.75@3 per box. Grapes-Malaga, light weight, \$7,50 per brl : heavy weight, fancy, \$8.50@9. Celery-25@40e per bunch.

Turnips-\$2 per bri. New Honey-20c. Bananas-Fancy, \$1.50@2.25 per bunch. Onions-Fancy yellow globe, \$3.50 per bri: red, \$3.25 per bri; \$1.25 per bu; Spanish, \$1.50

Hides, Leather, Tailow and Pelts. Leather-Oak sole, 23 @300; hemlock soles, 23@28c; harness, 25@31c; skirting, 34@35c; binck brid e, per doz, 2600965; fair bridle, \$600

65 per doz; city k.p. \$50@85; French kip, 750@ \$1.05; city calf skins, 75c@\$1; French calf skins. Sheep-Shearing, 20@30c; lambs, 40@75c. Grease-Brown, 21/e; yellow, 3e; white, 4e. Tallow-No. 1, 4e; No. 2, 31/c.

Hides-Market singgish and wesk; No. 1 tallow, 41/2; No. 2, 40; No. 1 cured, 41/40/40; No. 2 cured, le less; No. 1 green, 3c; No. 2 green, 21/2c. Poultry and Produce.

R. Hutchinson & Co. quote: Eggs-23c. Butter-16c; poor, 8(a10c; roll, 15c, Poultry-Hens, 7c; chiexens, 750; roosters, Se; turkeys, hen, 10c; tom, 9c; aid toms, 6c; Sheep-Receipts, 7.000: shipments, 1.800; geese, poor, \$3; full feathered, \$5.40; ducks, 7c. Feathers-Prime geese, 30(4350 per lb; duck,

Poultry-Hens, Se; spring, 11/4 to 2 lbs, Se; ronsters, 31/2; turkeys, 100; geese, poor, \$3@ 5.40 per doz; ducke, 7c. Butter-Grass butter, 15@17c; poor, 8@8e; roll, 17c. Seeds.

Dealers' prices in seeds are as follows: Clover, medium, recleaned, fair .\$5 85@6 60 good Clover, medium, recleaned, prime ... 6 90(2)7 20 Clover, mammoth, recleaned, prime 6 90(4)7 20 Timothy, prime to strictly prime.... 2 00 Timothy, recleaned, choice.......... 2 00@3 10

Blue grass, fancy

Orchard grass, prime. Red top English blue grass .. 1 65(4) 75 Queensware. Mason's pint fruit jars, per gross, \$7.50; quarts, \$7.50; two quarts, \$9.50; standard-quarts, \$3.50; two quarts, \$7.00; lightning, pints, \$11.00;

1 25

SUPREME COURT DECISIONS.

quarts, \$12.00; two quarts, \$16.00.

16,015. Miranda Culp et al. vs. Harvey C. Wilson, Elkhart C. C. Affirmed. Coffey, J. 16,185. Nathan D. Wolford vs. Herald printing and publishing company. Bar-

tholomew C. C. Affirmed. Hackney, J. 16,077. Emma E. Ho mes vs. Mariah L Holmes. Jackson C. C. Reversed. Olds, J.

15,900), Harrison Harlan vs. Logansport natural gas company. Clinton C. C. Af-